

SEQUENCE LISTING

<110> Geneprot, Inc.
Bougueleret, Lydie
Niknejad, Anne

<120> Secreted peptides

<130> 5021-WO01

<150> US 60/393,840
<151> 2002-07-02

<160> 10

<170> PatentIn version 3.1

<210> 1
<211> 1821
<212> PRT
<213> Homo Sapiens

<220>
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<222> (1)..(1821)
<223> latent transforming growth factor-beta-binding protein-2 precursor

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<222> (1)..(35)
<223> predicted by SignalP version 2.0

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Gly His Ala Gln Arg Asp Pro Val Gly Arg Tyr Glu Pro Ala Gly Gly
 35 40 45

Asp Ala Asn Arg Leu Arg Arg Pro Gly Gly Ser Tyr Pro Ala Ala Ala
 50 55 60

Ala Ala Lys Val Tyr Ser Leu Phe Arg Glu Gln Asp Ala Pro Val Ala
 65 70 75 80

Gly Leu Gln Pro Val Glu Arg Ala Gln Pro Gly Trp Gly Ser Pro Arg
 85 90 95

Arg Pro Thr Glu Ala Glu Ala Arg Arg Pro Ser Arg Ala Gln Gln Ser
 100 105 110

Arg Arg Val Gln Pro Pro Ala Gln Thr Arg Arg Ser Thr Pro Leu Gly
 115 120 125

Gln Gln Gln Pro Ala Pro Arg Thr Arg Ala Ala Pro Ala Leu Pro Arg
 130 135 140

Leu Gly Thr Pro Gln Arg Ser Gly Ala Ala Pro Pro Thr Pro Pro Arg
 145 150 155 160

Gly Arg Leu Thr Gly Arg Asn Val Cys Gly Gly Gln Cys Cys Pro Gly
 165 170 175

Trp Thr Thr Ala Asn Ser Thr Asn His Cys Ile Lys Pro Val Cys Glu
 180 185 190

Pro Pro Cys Gln Asn Arg Gly Ser Cys Ser Arg Pro Gln Leu Cys Val
 195 200 205

Cys Arg Ser Gly Phe Arg Gly Ala Arg Cys Glu Glu Val Ile Pro Asp
 210 215 220

Glu Glu Phe Asp Pro Gln Asn Ser Arg Leu Ala Pro Arg Arg Trp Ala
 225 230 235 240

Glu Arg Ser Pro Asn Leu Arg Arg Ser Ser Ala Ala Gly Glu Gly Thr
 245 250 255

Leu Ala Arg Ala Gln Pro Pro Ala Pro Gln Ser Pro Pro Ala Pro Gln
 260 265 270

Ser Pro Pro Ala Gly Thr Leu Ser Gly Leu Ser Gln Thr His Pro Ser
 275 280 285

Gln Gln His Val Gly Leu Ser Arg Thr Val Arg Leu His Pro Thr Ala
 290 295 300

Thr Ala Ser Ser Gln Leu Ser Ser Asn Ala Leu Pro Pro Gly Pro Gly
 305 310 315 320

Leu Glu Gln Arg Asp Gly Thr Gln Gln Ala Val Pro Leu Glu His Pro
 325 330 335

Ser Ser Pro Trp Gly Leu Asn Leu Thr Glu Lys Ile Lys Lys Ile Lys
 340 345 350

Ile Val Phe Thr Pro Thr Ile Cys Lys Gln Thr Cys Ala Arg Gly His
 355 360 365

Cys Ala Asn Ser Cys Glu Arg Gly Asp Thr Thr Thr Leu Tyr Ser Gln
 370 375 380

Gly Gly His Gly His Asp Pro Lys Ser Gly Phe Arg Ile Tyr Phe Cys
 385 390 395 400

Gln Ile Pro Cys Leu Asn Gly Gly Arg Cys Ile Gly Arg Asp Glu Cys
 405 410 415

Trp Cys Pro Ala Asn Ser Thr Gly Lys Phe Cys His Leu Pro Ile Pro
 420 425 430

Gln Pro Asp Arg Glu Pro Pro Gly Arg Gly Ser Arg Pro Arg Ala Leu
 435 440 445

Leu Glu Ala Pro Leu Lys Gln Ser Thr Phe Thr Leu Pro Leu Ser Asn
 450 455 460

Gln Leu Ala Ser Val Asn Pro Ser Leu Val Lys Val His Ile His His
 465 470 475 480

Pro Pro Glu Ala Ser Val Gln Ile His Gln Val Ala Gln Val Arg Gly
 485 490 495

Gly Val Glu Glu Ala Leu Val Glu Asn Ser Val Glu Thr Arg Pro Pro
 500 505 510

Pro Trp Leu Pro Ala Ser Pro Gly His Ser Leu Trp Asp Ser Asn Asn
 515 520 525

Ile Pro Ala Arg Ser Gly Glu Pro Pro Arg Pro Leu Pro Pro Ala Ala
 530 535 540

Pro Arg Pro Arg Gly Leu Leu Gly Arg Cys Tyr Leu Asn Thr Val Asn
 545 550 555 560

Gly Gln Cys Ala Asn Pro Leu Leu Glu Leu Thr Thr Gln Glu Asp Cys
 565 570 575

Cys Gly Ser Val Gly Ala Phe Trp Gly Val Thr Leu Cys Ala Pro Cys
 580 585 590

Pro Pro Arg Pro Ala Ser Pro Val Ile Glu Asn Gly Gln Leu Glu Cys
 595 600 605

Pro Gln Gly Tyr Lys Arg Leu Asn Leu Thr His Cys Gln Asp Ile Asn
 610 615 620

Glu Cys Leu Thr Leu Gly Leu Cys Lys Asp Ala Glu Cys Val Asn Thr
 625 630 635 640

Arg Gly Ser Tyr Leu Cys Thr Cys Arg Pro Gly Leu Met Leu Asp Pro
 645 650 655

Ser Arg Ser Arg Cys Val Ser Asp Lys Ala Ile Ser Met Leu Gln Gly
 660 665 670

Leu Cys Tyr Arg Ser Leu Gly Pro Gly Thr Cys Thr Leu Pro Leu Ala
 675 680 685

Gln Arg Ile Thr Lys Gln Ile Cys Cys Cys Ser Arg Val Gly Lys Ala
 690 695 700

Trp Gly Ser Glu Cys Glu Lys Cys Pro Leu Pro Gly Thr Glu Ala Phe
 705 710 715 720

Arg Glu Ile Cys Pro Ala Gly His Gly Tyr Thr Tyr Ala Ser Ser Asp
 725 730 735

Ile Arg Leu Ser Met Arg Lys Ala Glu Glu Glu Glu Leu Ala Arg Pro
 740 745 750

Pro Arg Glu Gln Gly Gln Arg Ser Ser Gly Ala Leu Pro Gly Pro Ala
 755 760 765

Glu Arg Gln Pro Leu Arg Val Val Thr Asp Thr Trp Leu Glu Ala Gly
 770 775 780

Thr Ile Pro Asp Lys Gly Asp Ser Gln Ala Gly Gln Val Thr Thr Ser
 785 790 795 800

Val Thr His Ala Pro Ala Trp Val Thr Gly Asn Ala Thr Thr Pro Pro
 805 810 815

Met Pro Glu Gln Gly Ile Ala Glu Ile Gln Glu Glu Gln Val Thr Pro
 820 825 830

Ser Thr Asp Val Leu Val Thr Leu Ser Thr Pro Gly Ile Asp Arg Cys
 835 840 845

Ala Ala Gly Ala Thr Asn Val Cys Gly Pro Gly Thr Cys Val Asn Leu
 850 855 860

Pro Asp Gly Tyr Arg Cys Val Cys Ser Pro Gly Tyr Gln Leu His Pro
 865 870 875 880

Ser Gln Ala Tyr Cys Thr Asp Asp Asn Glu Cys Leu Arg Asp Pro Cys
 885 890 895

Gln Gly Lys Gly Arg Cys Ile Asn Arg Val Gly Ser Tyr Ser Cys Phe
 900 905 910

Cys Tyr Pro Gly Tyr Thr Leu Ala Thr Ser Gly Ala Thr Gln Glu Cys
 915 920 925

Gln Asp Ile Asn Glu Cys Glu Gln Pro Gly Val Cys Ser Gly Gly Gln
 930 935 940

Cys Thr Asn Thr Glu Gly Ser Tyr His Cys Glu Cys Asp Gln Gly Tyr
 945 950 955 960

Ile Met Val Arg Lys Gly His Cys Gln Asp Ile Asn Glu Cys Arg His
 965 970 975

Pro Gly Thr Cys Pro Asp Gly Arg Cys Val Asn Ser Pro Gly Ser Tyr
 980 985 990

Thr Cys Leu Ala Cys Glu Glu Gly Tyr Arg Gly Gln Ser Gly Ser Cys
 995 1000 1005

Val Asp Val Asn Glu Cys Leu Thr Pro Gly Val Cys Ala His Gly
 1010 1015 1020

Lys Cys Thr Asn Leu Glu Gly Ser Phe Arg Cys Ser Cys Glu Gln
 1025 1030 1035

Gly Tyr Glu Val Thr Ser Asp Glu Lys Gly Cys Gln Asp Val Asp
 1040 1045 1050

Glu Cys Ala Ser Arg Ala Ser Cys Pro Thr Gly Leu Cys Leu Asn
 1055 1060 1065

Thr Glu Gly Ser Phe Ala Cys Ser Ala Cys Glu Asn Gly Tyr Trp
 1070 1075 1080

Val Asn Glu Asp Gly Thr Ala Cys Glu Asp Leu Asp Glu Cys Ala
 1085 1090 1095

Phe Pro Gly Val Cys Pro Ser Gly Val Cys Thr Asn Thr Ala Gly
 1100 1105 1110

Ser Phe Ser Cys Lys Asp Cys Asp Gly Gly Tyr Arg Pro Ser Pro
 1115 1120 1125

Leu Gly Asp Ser Cys Glu Asp Val Asp Glu Cys Glu Asp Pro Gln
 1130 1135 1140

Ser Ser Cys Leu Gly Gly Glu Cys Lys Asn Thr Val Gly Ser Tyr
 1145 1150 1155

Gln Cys Leu Cys Pro Gln Gly Phe Gln Leu Ala Asn Gly Thr Val
 1160 1165 1170

Cys Glu Asp Val Asn Glu Cys Met Gly Glu Glu His Cys Ala Pro
 1175 1180 1185

His Gly Glu Cys Leu Asn Ser His Gly Ser Phe Phe Cys Leu Cys
 1190 1195 1200

Ala Pro Gly Phe Val Ser Ala Glu Gly Gly Thr Ser Cys Gln Asp
 1205 1210 1215

Val Asp Glu Cys Ala Thr Thr Asp Pro Cys Val Gly Gly His Cys
 1220 1225 1230

Val Asn Thr Glu Gly Ser Phe Asn Cys Leu Cys Glu Thr Gly Phe
 1235 1240 1245

Gln Pro Ser Pro Glu Ser Gly Glu Cys Val Asp Ile Asp Glu Cys
 1250 1255 1260

Glu Asp Tyr Gly Asp Pro Val Cys Gly Thr Trp Lys Cys Glu Asn
 1265 1270 1275
 Ser Pro Gly Ser Tyr Arg Cys Val Leu Gly Cys Gln Pro Gly Phe
 1280 1285 1290
 His Met Ala Pro Asn Gly Asp Cys Ile Asp Ile Asp Glu Cys Ala
 1295 1300 1305
 Asn Asp Thr Met Cys Gly Ser His Gly Phe Cys Asp Asn Thr Asp
 1310 1315 1320
 Gly Ser Phe Arg Cys Leu Cys Asp Gln Gly Phe Glu Ile Ser Pro
 1325 1330 1335
 Ser Gly Trp Asp Cys Val Asp Val Asn Glu Cys Glu Leu Met Leu
 1340 1345 1350
 Ala Val Cys Gly Ala Ala Leu Cys Glu Asn Val Glu Gly Ser Phe
 1355 1360 1365
 Leu Cys Leu Cys Ala Ser Asp Leu Glu Glu Tyr Asp Ala Gln Glu
 1370 1375 1380
 Gly His Cys Arg Pro Arg Gly Ala Gly Gly Gln Ser Met Ser Glu
 1385 1390 1395
 Ala Pro Thr Gly Asp His Ala Pro Ala Pro Thr Arg Met Asp Cys
 1400 1405 1410
 Tyr Ser Gly Gln Lys Gly His Ala Pro Cys Ser Ser Val Leu Gly
 1415 1420 1425
 Arg Asn Thr Thr Gln Ala Glu Cys Cys Cys Thr Gln Gly Ala Thr
 1430 1435 1440
 Trp Gly Asp Ala Cys Asp Leu Cys Pro Ser Glu Asp Ser Ala Glu
 1445 1450 1455

Phe Ser	Glu Ile Cys Pro Ser	Gly Lys Gly Tyr Ile	Pro Val Glu
1460	1465	1470	
Gly Ala	Trp Thr Phe Gly Gln	Thr Met Tyr Thr Asp	Ala Asp Glu
1475	1480	1485	
Cys Val	Ile Phe Gly Pro Gly	Leu Cys Pro Asn Gly	Arg Cys Leu
1490	1495	1500	
Asn Thr	Val Pro Gly Tyr Val	Cys Leu Cys Asn Pro	Gly Phe His
1505	1510	1515	
Tyr Asp	Ala Ser His Lys Lys	Cys Glu Asp His Asp	Glu Cys Gln
1520	1525	1530	
Asp Leu	Ala Cys Glu Asn Gly	Glu Cys Val Asn Thr	Glu Gly Ser
1535	1540	1545	
Phe His	Cys Phe Cys Ser Pro	Pro Leu Thr Leu Asp	Leu Ser Gln
1550	1555	1560	
Gln Arg	Cys Met Asn Ser Thr	Ser Ser Thr Glu Asp	Leu Pro Asp
1565	1570	1575	
His Asp	Ile His Met Asp Ile	Cys Trp Lys Lys Val	Thr Asn Asp
1580	1585	1590	
Val Cys	Ser Glu Pro Leu Arg	Gly His Arg Thr Thr	Tyr Thr Glu
1595	1600	1605	
Cys Cys	Cys Gln Asp Gly Lys	Ala Trp Ser Gln Gln	Cys Ala Leu
1610	1615	1620	
Cys Pro	Pro Arg Ser Ser Glu	Val Tyr Ala Gln Leu	Cys Asn Val
1625	1630	1635	
Ala Arg	Ile Glu Ala Glu Arg	Glu Ala Gly Val His	Phe Arg Pro
1640	1645	1650	
Gly Tyr	Glu Tyr Gly Pro Gly	Pro Asp Asp Leu His	Tyr Ser Ile
1655	1660	1665	

Tyr Gly Pro Asp Gly Ala Pro Phe Tyr Asn Tyr Leu Gly Pro Glu
 1670 1675 1680
 Asp Thr Val Pro Glu Pro Ala Phe Pro Asn Thr Ala Gly His Ser
 1685 1690 1695
 Ala Asp Arg Thr Pro Ile Leu Glu Ser Pro Leu Gln Pro Ser Glu
 1700 1705 1710
 Leu Gln Pro His Tyr Val Ala Ser His Pro Glu Pro Pro Ala Gly
 1715 1720 1725
 Phe Glu Gly Leu Gln Ala Glu Glu Cys Gly Ile Leu Asn Gly Cys
 1730 1735 1740
 Glu Asn Gly Arg Cys Val Arg Val Arg Glu Gly Tyr Thr Cys Asp
 1745 1750 1755
 Cys Phe Glu Gly Phe Gln Leu Asp Ala Ala His Met Ala Cys Val
 1760 1765 1770
 Asp Val Asn Glu Cys Asp Asp Leu Asn Gly Pro Ala Val Leu Cys
 1775 1780 1785
 Val His Gly Tyr Cys Glu Asn Thr Glu Gly Ser Tyr Arg Cys His
 1790 1795 1800
 Cys Ser Pro Gly Tyr Val Ala Glu Ala Gly Pro Pro His Cys Thr
 1805 1810 1815
 Ala Lys Glu
 1820

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<223> mature protein

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Val Tyr Ser Leu Phe Arg Glu Gln Asp Ala Pro Val Ala Gly Leu Gln
35 40 45

Pro Val Glu Arg Ala Gln Pro Gly Trp Gly Ser Pro Arg Arg Pro Thr
50 55 60

Glu Ala Glu Ala Arg Arg Pro Ser Arg Ala Gln Gln Ser Arg Arg Val
65 70 75 80

Gln Pro Pro Ala Gln Thr Arg Arg Ser Thr Pro Leu Gly Gln Gln Gln
85 90 95

Pro Ala Pro Arg Thr Arg Ala Ala Pro Ala Leu Pro Arg Leu Gly Thr
100 105 110

Pro Gln Arg Ser Gly Ala Ala Pro Pro Thr Pro Pro Arg Gly Arg Leu
115 120 125

Thr Gly Arg Asn Val Cys Gly Gly Gln Cys Cys Pro Gly Trp Thr Thr
130 135 140

Ala Asn Ser Thr Asn His Cys Ile Lys Pro Val Cys Glu Pro Pro Cys
145 150 155 160

Gln Asn Arg Gly Ser Cys Ser Arg Pro Gln Leu Cys Val Cys Arg Ser
165 170 175

Gly Phe Arg Gly Ala Arg Cys Glu Glu Val Ile Pro Asp Glu Glu Phe
180 185 190

Asp Pro Gln Asn Ser Arg Leu Ala Pro Arg Arg Trp Ala Glu Arg Ser

195	200	205
Pro Asn Leu Arg Arg Ser Ser Ala Ala Gly Glu Gly Thr Leu Ala Arg		
210	215	220
Ala Gln Pro Pro Ala Pro Gln Ser Pro Pro Ala Pro Gln Ser Pro Pro		
225	230	235 240
Ala Gly Thr Leu Ser Gly Leu Ser Gln Thr His Pro Ser Gln Gln His		
245	250	255
Val Gly Leu Ser Arg Thr Val Arg Leu His Pro Thr Ala Thr Ala Ser		
260	265	270
Ser Gln Leu Ser Ser Asn Ala Leu Pro Pro Gly Pro Gly Leu Glu Gln		
275	280	285
Arg Asp Gly Thr Gln Gln Ala Val Pro Leu Glu His Pro Ser Ser Pro		
290	295	300
Trp Gly Leu Asn Leu Thr Glu Lys Ile Lys Lys Ile Lys Ile Val Phe		
305	310	315 320
Thr Pro Thr Ile Cys Lys Gln Thr Cys Ala Arg Gly His Cys Ala Asn		
325	330	335
Ser Cys Glu Arg Gly Asp Thr Thr Thr Leu Tyr Ser Gln Gly Gly His		
340	345	350
Gly His Asp Pro Lys Ser Gly Phe Arg Ile Tyr Phe Cys Gln Ile Pro		
355	360	365
Cys Leu Asn Gly Gly Arg Cys Ile Gly Arg Asp Glu Cys Trp Cys Pro		
370	375	380
Ala Asn Ser Thr Gly Lys Phe Cys His Leu Pro Ile Pro Gln Pro Asp		
385	390	395 400
Arg Glu Pro Pro Gly Arg Gly Ser Arg Pro Arg Ala Leu Leu Glu Ala		
405	410	415

Pro Leu Lys Gln Ser Thr Phe Thr Leu Pro Leu Ser Asn Gln Leu Ala
 420 425 430

Ser Val Asn Pro Ser Leu Val Lys Val His Ile His His Pro Pro Glu
 435 440 445

Ala Ser Val Gln Ile His Gln Val Ala Gln Val Arg Gly Gly Val Glu
 450 455 460

Glu Ala Leu Val Glu Asn Ser Val Glu Thr Arg Pro Pro Pro Trp Leu
 465 470 475 480

Pro Ala Ser Pro Gly His Ser Leu Trp Asp Ser Asn Asn Ile Pro Ala
 485 490 495

Arg Ser Gly Glu Pro Pro Arg Pro Leu Pro Pro Ala Ala Pro Arg Pro
 500 505 510

Arg Gly Leu Leu Gly Arg Cys Tyr Leu Asn Thr Val Asn Gly Gln Cys
 515 520 525

Ala Asn Pro Leu Leu Glu Leu Thr Thr Gln Glu Asp Cys Cys Gly Ser
 530 535 540

Val Gly Ala Phe Trp Gly Val Thr Leu Cys Ala Pro Cys Pro Pro Arg
 545 550 555 560

Pro Ala Ser Pro Val Ile Glu Asn Gly Gln Leu Glu Cys Pro Gln Gly
 565 570 575

Tyr Lys Arg Leu Asn Leu Thr His Cys Gln Asp Ile Asn Glu Cys Leu
 580 585 590

Thr Leu Gly Leu Cys Lys Asp Ala Glu Cys Val Asn Thr Arg Gly Ser
 595 600 605

Tyr Leu Cys Thr Cys Arg Pro Gly Leu Met Leu Asp Pro Ser Arg Ser
 610 615 620

Arg Cys Val Ser Asp Lys Ala Ile Ser Met Leu Gln Gly Leu Cys Tyr

625		630		635		640
Arg Ser Leu Gly	Pro Gly Thr Cys Thr	Leu Pro Leu Ala Gln Arg Ile				
	645	650		655		
Thr Lys Gln Ile	Cys Cys Cys Ser Arg Val Gly Lys Ala Trp Gly Ser					
	660	665		670		
Glu Cys Glu Lys	Cys Pro Leu Pro Gly Thr Glu Ala Phe Arg Glu Ile					
	675	680		685		
Cys Pro Ala Gly	His Gly Tyr Thr Tyr Ala Ser Ser Asp Ile Arg Leu					
	690	695		700		
Ser Met Arg Lys	Ala Glu Glu Glu Glu Leu Ala Arg Pro Pro Arg Glu					
	705	710		715		720
Gln Gly Gln Arg	Ser Ser Gly Ala Leu Pro Gly Pro Ala Glu Arg Gln					
	725	730		735		
Pro Leu Arg Val	Val Thr Asp Thr Trp Leu Glu Ala Gly Thr Ile Pro					
	740	745		750		
Asp Lys Gly Asp	Ser Gln Ala Gly Gln Val Thr Thr Ser Val Thr His					
	755	760		765		
Ala Pro Ala Trp	Val Thr Gly Asn Ala Thr Thr Pro Pro Met Pro Glu					
	770	775		780		
Gln Gly Ile Ala	Glu Ile Gln Glu Glu Gln Val Thr Pro Ser Thr Asp					
	785	790		795		800
Val Leu Val Thr	Leu Ser Thr Pro Gly Ile Asp Arg Cys Ala Ala Gly					
	805	810		815		
Ala Thr Asn Val	Cys Gly Pro Gly Thr Cys Val Asn Leu Pro Asp Gly					
	820	825		830		
Tyr Arg Cys Val	Cys Ser Pro Gly Tyr Gln Leu His Pro Ser Gln Ala					
	835	840		845		

Tyr Cys Thr Asp Asp Asn Glu Cys Leu Arg Asp Pro Cys Gln Gly Lys
 850 855 860

Gly Arg Cys Ile Asn Arg Val Gly Ser Tyr Ser Cys Phe Cys Tyr Pro
 865 870 875 880

Gly Tyr Thr Leu Ala Thr Ser Gly Ala Thr Gln Glu Cys Gln Asp Ile
 885 890 895

Asn Glu Cys Glu Gln Pro Gly Val Cys Ser Gly Gly Gln Cys Thr Asn
 900 905 910

Thr Glu Gly Ser Tyr His Cys Glu Cys Asp Gln Gly Tyr Ile Met Val
 915 920 925

Arg Lys Gly His Cys Gln Asp Ile Asn Glu Cys Arg His Pro Gly Thr
 930 935 940

Cys Pro Asp Gly Arg Cys Val Asn Ser Pro Gly Ser Tyr Thr Cys Leu
 945 950 955 960

Ala Cys Glu Glu Gly Tyr Arg Gly Gln Ser Gly Ser Cys Val Asp Val
 965 970 975

Asn Glu Cys Leu Thr Pro Gly Val Cys Ala His Gly Lys Cys Thr Asn
 980 985 990

Leu Glu Gly Ser Phe Arg Cys Ser Cys Glu Gln Gly Tyr Glu Val Thr
 995 1000 1005

Ser Asp Glu Lys Gly Cys Gln Asp Val Asp Glu Cys Ala Ser Arg
 1010 1015 1020

Ala Ser Cys Pro Thr Gly Leu Cys Leu Asn Thr Glu Gly Ser Phe
 1025 1030 1035

Ala Cys Ser Ala Cys Glu Asn Gly Tyr Trp Val Asn Glu Asp Gly
 1040 1045 1050

Thr Ala Cys Glu Asp Leu Asp Glu Cys Ala Phe Pro Gly Val Cys

1055		1060		1065
Pro Ser Gly Val Cys Thr Asn Thr Ala Gly Ser Phe Ser Cys Lys				
1070		1075		1080
Asp Cys Asp Gly Gly Tyr Arg Pro Ser Pro Leu Gly Asp Ser Cys				
1085		1090		1095
Glu Asp Val Asp Glu Cys Glu Asp Pro Gln Ser Ser Cys Leu Gly				
1100		1105		1110
Gly Glu Cys Lys Asn Thr Val Gly Ser Tyr Gln Cys Leu Cys Pro				
1115		1120		1125
Gln Gly Phe Gln Leu Ala Asn Gly Thr Val Cys Glu Asp Val Asn				
1130		1135		1140
Glu Cys Met Gly Glu Glu His Cys Ala Pro His Gly Glu Cys Leu				
1145		1150		1155
Asn Ser His Gly Ser Phe Phe Cys Leu Cys Ala Pro Gly Phe Val				
1160		1165		1170
Ser Ala Glu Gly Gly Thr Ser Cys Gln Asp Val Asp Glu Cys Ala				
1175		1180		1185
Thr Thr Asp Pro Cys Val Gly Gly His Cys Val Asn Thr Glu Gly				
1190		1195		1200
Ser Phe Asn Cys Leu Cys Glu Thr Gly Phe Gln Pro Ser Pro Glu				
1205		1210		1215
Ser Gly Glu Cys Val Asp Ile Asp Glu Cys Glu Asp Tyr Gly Asp				
1220		1225		1230
Pro Val Cys Gly Thr Trp Lys Cys Glu Asn Ser Pro Gly Ser Tyr				
1235		1240		1245
Arg Cys Val Leu Gly Cys Gln Pro Gly Phe His Met Ala Pro Asn				
1250		1255		1260

Gly Asp Cys Ile Asp Ile Asp Glu Cys Ala Asn Asp Thr Met Cys
 1265 1270 1275

Gly Ser His Gly Phe Cys Asp Asn Thr Asp Gly Ser Phe Arg Cys
 1280 1285 1290

Leu Cys Asp Gln Gly Phe Glu Ile Ser Pro Ser Gly Trp Asp Cys
 1295 1300 1305

Val Asp Val Asn Glu Cys Glu Leu Met Leu Ala Val Cys Gly Ala
 1310 1315 1320

Ala Leu Cys Glu Asn Val Glu Gly Ser Phe Leu Cys Leu Cys Ala
 1325 1330 1335

Ser Asp Leu Glu Glu Tyr Asp Ala Gln Glu Gly His Cys Arg Pro
 1340 1345 1350

Arg Gly Ala Gly Gly Gln Ser Met Ser Glu Ala Pro Thr Gly Asp
 1355 1360 1365

His Ala Pro Ala Pro Thr Arg Met Asp Cys Tyr Ser Gly Gln Lys
 1370 1375 1380

Gly His Ala Pro Cys Ser Ser Val Leu Gly Arg Asn Thr Thr Gln
 1385 1390 1395

Ala Glu Cys Cys Cys Thr Gln Gly Ala Thr Trp Gly Asp Ala Cys
 1400 1405 1410

Asp Leu Cys Pro Ser Glu Asp Ser Ala Glu Phe Ser Glu Ile Cys
 1415 1420 1425

Pro Ser Gly Lys Gly Tyr Ile Pro Val Glu Gly Ala Trp Thr Phe
 1430 1435 1440

Gly Gln Thr Met Tyr Thr Asp Ala Asp Glu Cys Val Ile Phe Gly
 1445 1450 1455

Pro Gly Leu Cys Pro Asn Gly Arg Cys Leu Asn Thr Val Pro Gly

1460		1465		1470
Tyr Val Cys Leu Cys Asn Pro Gly Phe His Tyr Asp Ala Ser His				
1475		1480		1485
Lys Lys Cys Glu Asp His Asp Glu Cys Gln Asp Leu Ala Cys Glu				
1490		1495		1500
Asn Gly Glu Cys Val Asn Thr Glu Gly Ser Phe His Cys Phe Cys				
1505		1510		1515
Ser Pro Pro Leu Thr Leu Asp Leu Ser Gln Gln Arg Cys Met Asn				
1520		1525		1530
Ser Thr Ser Ser Thr Glu Asp Leu Pro Asp His Asp Ile His Met				
1535		1540		1545
Asp Ile Cys Trp Lys Lys Val Thr Asn Asp Val Cys Ser Glu Pro				
1550		1555		1560
Leu Arg Gly His Arg Thr Thr Tyr Thr Glu Cys Cys Cys Gln Asp				
1565		1570		1575
Gly Lys Ala Trp Ser Gln Gln Cys Ala Leu Cys Pro Pro Arg Ser				
1580		1585		1590
Ser Glu Val Tyr Ala Gln Leu Cys Asn Val Ala Arg Ile Glu Ala				
1595		1600		1605
Glu Arg Glu Ala Gly Val His Phe Arg Pro Gly Tyr Glu Tyr Gly				
1610		1615		1620
Pro Gly Pro Asp Asp Leu His Tyr Ser Ile Tyr Gly Pro Asp Gly				
1625		1630		1635
Ala Pro Phe Tyr Asn Tyr Leu Gly Pro Glu Asp Thr Val Pro Glu				
1640		1645		1650
Pro Ala Phe Pro Asn Thr Ala Gly His Ser Ala Asp Arg Thr Pro				
1655		1660		1665

Ile Leu Glu Ser Pro Leu Gln Pro Ser Glu Leu Gln Pro His Tyr
 1670 1675 1680

Val Ala Ser His Pro Glu Pro Pro Ala Gly Phe Glu Gly Leu Gln
 1685 1690 1695

Ala Glu Glu Cys Gly Ile Leu Asn Gly Cys Glu Asn Gly Arg Cys
 1700 1705 1710

Val Arg Val Arg Glu Gly Tyr Thr Cys Asp Cys Phe Glu Gly Phe
 1715 1720 1725

Gln Leu Asp Ala Ala His Met Ala Cys Val Asp Val Asn Glu Cys
 1730 1735 1740

Asp Asp Leu Asn Gly Pro Ala Val Leu Cys Val His Gly Tyr Cys
 1745 1750 1755

Glu Asn Thr Glu Gly Ser Tyr Arg Cys His Cys Ser Pro Gly Tyr
 1760 1765 1770

Val Ala Glu Ala Gly Pro Pro His Cys Thr Ala Lys Glu
 1775 1780 1785

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 <212> PRT
 <213> Homo Sapiens

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Gln Arg Asp Pro Val Gly Arg Tyr Glu Pro Ala Gly Gly Asp Ala Asn
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Arg Leu Arg Arg Pro Gly Gly Ser Tyr Pro Ala Ala Ala Ala Ala Lys
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Val Tyr Ser Leu Phe Arg Glu Gln Asp Ala Pro Val Ala Gly Leu Gln
 35 40 45

Pro Val Glu Arg Ala Gln Pro Gly Trp Gly Ser Pro Arg Arg Pro Thr
 50 55 60

Glu Ala Glu Ala Arg Arg Pro Ser Arg Ala Gln Gln Ser Arg Arg
 65 70 75

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Gln Arg Asp Pro Val Gly Arg Tyr Glu Pro Ala Gly Gly Asp Ala Asn
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Arg Leu Arg Arg Pro Gly Gly Ser Tyr Pro Ala Ala Ala Ala Lys
 20 25 30

Val Tyr Ser Leu Phe Arg Glu Gln Asp Ala Pro Val Ala Gly Leu Gln
 35 40 45

Pro Val Glu Arg Ala Gln Pro Gly Trp Gly Ser Pro Arg Arg Pro Thr
 50 55 60

Glu Ala Glu Ala Arg Arg
 65 70

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Gln Arg Asp Pro Val Gly Arg Tyr Glu Pro Ala Gly Gly Asp Ala Asn
 1 5 10 15

Arg Leu Arg Arg Pro Gly Gly Ser Tyr Pro Ala Ala Ala Ala Lys
 20 25 30

Val Tyr Ser Leu Phe Arg Glu Gln Asp Ala Pro Val Ala Gly Leu Gln
 35 40 45

Pro Val Glu Arg Ala Gln Pro Gly Trp Gly Ser Pro Arg Arg
 50 55 60

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Leu Arg Arg Pro Gly Gly Ser Tyr Pro Ala Ala Ala Ala Ala Lys
1 5 10 15

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Arg Pro Gly Gly Ser Tyr Pro Ala Ala Ala Ala Ala Lys
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Val Tyr Ser Leu Phe Arg Glu Gln Asp Ala Pro Val Ala Gly Leu Gln
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Pro Val Glu Arg
20

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Glu Gln Asp Ala Pro Val Ala Gly Leu Gln Pro Val Glu Arg
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Ala Gln Pro Gly Trp Gly Ser Pro Arg
1 5